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Exhibit R-2, PB 2010 Office of Secretary Of Defense RDT&E Budget Item Justification								DATE: May 2009		
APPROPRIATION/BUDGET ACTIVITY					R-1 ITEM NOMENCLATURE					
0400 - Research, Development, Test & Evaluation, Defense-Wide/BA 3 - Advanced Technology Development (ATD)					PE 0603828D8Z Joint Experimentation					
COST (\$ in Millions)	FY 2008 Actual	FY 2009 Estimate	FY 2010 Estimate	FY 2011 Estimate	FY 2012 Estimate	FY 2013 Estimate	FY 2014 Estimate	FY 2015 Estimate	Cost To Complete	Total Cost
Total Program Element	103.853	108.777	124.480						Continuing	Continuing
P808: Joint Experimentation	103.853	108.777	124.480						Continuing	Continuing

A. Mission Description and Budget Item Justification

The Joint Experimentation (JE) Program funds Department of Defense efforts to explore future joint and coalition force attributes and structure, to ascertain gaps in current joint force capabilities, to influence Department force development and employment policy, and to examine potential solutions for joint requirements through targeted Doctrine, Organizational, Training, Materiel, Leadership and Facilities (DOTMLPF) improvements. JE serves as centerpiece and balancing investment to a broader Defense experimentation enterprise inclusive of investments by Military Services and Defense Agencies. Office of the Secretary of Defense oversight emphasizes disciplined design and cost control of individual projects, and on achievement of meaningful results that can be assessed with metrics based on incremental force improvements. Defense experiments address wide-ranging joint issues and opportunities registered by the Combatant Commands, Services and defense Agencies through the Warfighting Challenge process. The community of Defense Experimentation and operational customers work with OSD and USJFCOM to set priorities for this process. In the larger scheme of Defense capability development, JE naturally flows from operational analysis, identifies potential capability gap remedies and explores the feasibility of force enhancements. By exposing potential shortfalls and exploring opportunities, JE is essentially an early risk mitigation tool preceding force capability investments. In addressing these validated needs, close alignment and synchronization with Service/Agency wargaming and experimentation efforts are essential for efficient funding leverage and for effective transition of joint experimentation outcomes into improvements for forces deployed to support joint missions. Management initiatives in FY09 redress an investment reserve for emerging experimentation needs of Combatant Commands in the current funding year. Funding efficiency is pursued by emphasizing USJFCOM as the primary provider of Modeling and Simulation (M&S), networked scenario distribution, and analysis services.

USJFCOM leads, coordinates and integrates the Department of Defense's (DOD) Joint Concept Development and Experimentation (JCD&E) Program, a major element of the RDT&E-funded Joint Experimentation Program. JCD&E is executed through an enterprise approach which focuses, prioritizes, synchronizes, and conducts experimentation work within DoD and with key USG partners. Flowing from Office of the Secretary of Defense (OSD) JE policy guidance in the Guidance Development of the Force (GDF), JE addresses key developmental and remedial capabilities responding to current and future security challenges. By applying concept development and analysis-based experimentation to concepts and proposed capabilities in the context of near-term and projected future conditions, JE provides essential insights and a range of potential solutions to current warfighting efforts and future force development. The JE Program funds the JCD&E process and individual Combatant Commander experimentation initiatives to develop the foundation for new and improved joint military concepts and capabilities.

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<p>Joint experimentation concepts are informed by current lessons learned and experimentation. In FY 08, the JCD&E effort led by USJFCOM delivered the military contribution to Cooperative Security Joint Operating Concept and Strategic Communications Joint Integrating Concept, and laid the foundation for the delivery in FY 09 of a revised Capstone Concept for Joint Operations (CCJO), the Chairman's foundational document that describes how the future joint force will operate in an uncertain, complex and changing future characterized by persistent conflict. The revised CCJO will guide development and employment of the future joint force, and set the stage for development of the supporting concepts in FY 09 and 10. In turn, these supporting concepts will identify capabilities the joint force commander will need to operate under the changing conditions outlined in the CCJO.</p> <p>In FY 08, a number of important capabilities were transitioned via the JCD&E efforts to CoComs, service and agency force developers, and acquisition authorities for delivery to the joint force. These capabilities include the framework for processes, function and structure of the new USAFRICOM staff, and a draft Rule of Law planning framework for combatant commander staffs delivered to USEUCOM, USAFRICOM, USCENTCOM and USSOUTHCOM. In addition, NATO Logistics Functional Services, Logistics Information Management Group (LOG FS IMG) and the Chairman of the NATO Data Management Sub Working Group (DMSWG) adopted the Information Requirement (IR) expansion methodology developed under the MNE5 Logistics project. This methodology will serve as the baseline for integrating both legacy and future national and NATO information systems under the NATO Logistics Functional Services Capability Package.</p> <p>In FY 08, USJFCOM completed several key experiments, including Noble Resolve, which delivered homeland defense and disaster response solutions to military and civil agencies from national to local level. Responders were able to employ several of these solutions in response to natural disasters that occurred in the United States. In FY 09 and 10, experimental partnerships will address homeland defense warfighter challenges identified by Northern Command and informed by concept development work on integrating concepts developed for the CCJO. Experimentation with the Department of State and civilian agencies developed and evaluated interagency planning and coordination frameworks for whole of government crisis response. The results of Unified Action '08 set the stage for delivery in FY-09 of Commander's Handbooks in numerous sectoral areas for use by the Joint Force Commander to assess conditions and to provide planning frameworks to support the delivery of critical services to host nations as part of a integrated whole of government approach. FY 09 and 10 experimentation will include work on critical warfighter challenges such as full spectrum awareness, strategic lift and logistics in support of national objectives, cyber space, communications for battle space awareness, missile defense, and command and control that integrates joint, service, interagency and multinational processes for rapid and flexible response.</p> <p>Joint experimentation and service experimentation are complementary efforts. Joint experimentation focuses on the needs of the Joint Force Commander; Service experimentation focuses on military forces flowing through component commanders that the joint force commander will employ. The robust collaborative planning of joint and service experimentation, ensures that joint context, concepts, and anticipated capabilities are effectively integrated into service experimentation as appropriate. In FY 09 and 10 , joint war fighting challenges will be addressed in joint and service experimentation, and capability solutions will be analyzed and defined in a collaborative process.</p> <p>Joint experimentation differs from joint exercises in that experimentation seeks innovative alternatives for future forces while joint exercises prepare and test the readiness of today's forces for today's challenges in the existing environment. Experimentation vets and validates and focuses primarily in the out years; exercises</p>		

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test units and are concerned with today's operations. In FY 09 and 10, joint experimentation will exploit opportunities presented by joint exercises to the extent that experimentation does not interfere with joint training conditions or standards so that units attain their exercise objectives. Battlefield experimentation and innovation which has occurred in operational units is captured through lessons learned and actively solicited from deployed units for use in defining DOTMLPF-P solutions for the warfighter challenges. In FY 08, experimental support to operations in Afghanistan included forward a deployed team and reach back capability to support the Joint Force Commander's need for insights on the enemy's political, economic, cultural, social, intelligence, and information systems. In FY 09 and 10, battlefield experimentation will continue to be an important component of joint experimentation on command and control, interagency and whole of government approaches, and integration of intelligence and operations in support of the Joint Force Commander.				
A relatively stabile investment projection for the JE Program tends to obscure continuing aggressive efforts to derive greater return on investment for the DoD. From the perspective of OSD engagement and oversight, emphasis will be focused on the following refinements to in influential business model.				
<div>- Tracing JE efforts to discriminate changes to joint capabilities.</div> <div>- Tying JE closer to Department operational analysis & Defense Planning Scenarios.</div> <div>- Periodically and deliberately redressing balances between near-term critical capability adjustments and long-term capability conceptualization.</div> <div>- Positioning JE in a larger scheme of overarching capability development that begins with lessons learned and critical analysis, enjoins JE, and progresses through demonstration, acquisition, and training.</div>				
B. Program Change Summary (\$ in Millions)				
	FY 2008	FY 2009	FY 2010	FY 2011
Previous President's Budget	107.240	114.947	117.571	
Current BES/President's Budget	103.853	108.777	124.480	
Total Adjustments	-3.387	-6.170	6.909	
Congressional Program Reductions		-6.770		
Congressional Rescissions		-0.600		
Total Congressional Increases		1.200		
Total Reprogrammings	-0.589			
SBIR/STTR Transfer	-2.583			
Undistributed reduction	-0.215			
Other			6.909	
Congressional Increase Details (\$ in Millions)				
Project: P808, Collaboration Gateway				
	FY 2008	FY 2009		
		1.200		

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USJFCOM leads, coordinates and integrates the Department of Defense's (DOD) Joint Concept Development and Experimentation (JCD&E) Program, a major element of the RDT&E-funded Joint Experimentation Program. JCD&E is executed through an enterprise approach which focuses, prioritizes, synchronizes, and conducts experimentation work within DoD and with key USG partners. Flowing from Office of the Secretary of Defense (OSD) JE policy guidance in the Guidance Development of the Force (GDF), JE addresses key developmental and remedial capabilities responding to current and future security challenges. By applying concept development and analysis-based experimentation to concepts and proposed capabilities in the context of near-term and projected future conditions, JE provides essential insights and a range of potential solutions to current warfighting efforts and future force development. The JE Program funds the JCD&E process and individual Combatant Commander experimentation initiatives to develop the foundation for new and improved joint military concepts and capabilities.

A relatively stable investment projection for the JE Program tends to obscure continuing aggressive efforts to derive greater return on investment for the DoD. From the perspective of OSD engagement and oversight, emphasis will be focused on the following refinements to the influential JE business model.

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<p>-Tying JE closer to Department operational analysis & Defense Planning Scenarios.</p> <p>-Periodically and deliberately redressing balances between near-term critical capability adjustments and long-term capability conceptualization.</p> <p>-Positioning JE in a larger scheme of overarching capability development that begins with lessons learned and critical analysis, enjoins JE, and progresses through demonstration, acquisition, and training.</p> <p>In FY 08, Office of the Secretary of Defense (OSD) provided policy guidance for JE in the Guidance Development of the Force (GDF), and Combatant Commands, Services, Joint Staff and OSD provided their most pressing warfighting challenges (WFCs) to the nascent JCD&E Enterprise led by USJFCOM. FY 09 will be a transformation year for JCD&E. In FY 09, the joint experimentation enterprise built its portfolio around resolution of WFCs, thereby ensuring focus from the start on DoD's highest joint experimentation priorities in a resource-challenged environment. The result is a balanced portfolio across the Enterprise, designed to address both today's conflicts and the transformation of the future force. In FY 10 , resolution of warfighter challenges and the emerging insights from the Capstone Concept of Joint Operations and its three integrating concepts will drive experimentation. In FY 09, the JE enterprise built its portfolio around resolution of WFCs. In FY 10, resolution of WFCs and the emerging insights from the Capstone Concept of Joint Operations will drive experimentation.</p> <p>JCD&E projects in FY 08 provided solutions to current operations in the areas of integrated ISR, cross-domain information sharing, joint fires, joint C2 and logistics, and supported force transformation efforts in the areas of shaping, home land defense, multi-national and interagency operations, adaptive planning and irregular warfare. FY 09 and 10 experimentation efforts are organized into Lines of Joint Experimentation (LOJX) which group prioritized war fighter challenges into areas of related or complementary work. This organizational construct facilitates DoD-wide understanding and tracking of planned joint experimentation activities and resulting products and outcomes by matching the Tier 1 Joint Capability Areas. JCD&E work follows seven LOJXs, including: Battlespace Awareness (BA), Building Partnerships (BP), Command & Control (C2), Force Application (FA), Logistics (LOG), Net – Centric (NC) and Protection (P). In addition, in FY 08, USJFCOM employed Community Management and Support to establish the DoD-wide JCD&E Enterprise. In FY 09 and beyond, the Enterprise will continue to contribute to overall DoD JCD&E results.</p> <p>In FY 09, USJFCOM established an Irregular Warfare Center (IWC), to serve as the USJFCOM Commander's advisor and proponent concerning Irregular Warfare, leveraging current DoD executive agent for Joint Urban Operations responsibilities to achieve increased synergy. The IWC leads and directs the integrated USJFCOM approach with DoD, Multinational and Interagency partners for Joint Force Irregular Warfare (IW) concept development, training, integration, doctrine development, and experimentation to ensure Joint Forces IW capabilities meet Combatant Commander campaign and complex contingency requirements.</p>					
B. Accomplishments/Planned Program (\$ in Millions)		FY 2008	FY 2009	FY 2010	FY 2011
Building Partnerships (BP)		30.819	34.688	24.876	
BP is a new LOJX for FY09 (formerly referred to as Shaping & Comprehensive Approach Limited Objective Experiment). Building Partnerships: BP LOJX projects will provide the Joint Force Commander the ability to set the conditions for interaction with partner, competitor or adversary leaders, military forces,					

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<p>or relevant populations by developing and presenting information and conducting activities to affect their perceptions, will, behavior, and capabilities.</p> <p><i>FY 2008 Accomplishments:</i></p> <p>AFRICOM Interagency Mission Analysis</p> <p>-Facilitated interagency mission analysis (IMA) and experimentation to assist EUCOM in determining the necessary roles, mission partnerships, processes and staff structure for AFRICOM's military support to a "whole of U.S. Government" approach to operations and programs in Africa. Products included interim reports from interagency workshops on Public Diplomacy, Rule of Law, Support to Economic Initiatives, Counter-Narcotics & Transnational Crime, Combating Weapons of Mass Destruction (WMD), Development and Conflict Mitigation, Public Diplomacy/Strategic Communication, and Security Sector Reform, and an AFRICOM Interagency Mission Analysis Final Report.</p> <p>Unified Action</p> <p>-Improved the Joint Force Commanders capability to conduct stability and reconstruction operations with other U.S. government agencies in support of the DoD implementation plan for National Security Presidential Directive-44. Working with other U.S. Government agencies, JFCOM supported or delivered planning frameworks, handbooks, guides, CONOPS, and white papers including:</p> <p>-- Provided written input and experimental support to the Department of State Office of the Coordinator for Reconstruction and Stabilization (S/CRS) in developing the U.S. Government Planning Framework for Reconstruction, Stabilization, and Conflict Transformation and the Interagency Management System Operations Guide;</p> <p>--Partnered in interagency effort that produced an Interagency Conflict Assessment Framework (ICAF);</p> <p>--Assisted OSD in producing Ungoverned Areas Whitepaper;</p> <p>--Assisted S/CRS in developing a Post-conflict Elections Guide;</p> <p>--Collaborated with U.S. Army Corps of Engineers to produce metrics for whole of government activities in conflict environments producing a Measuring Progress in Conflict Environments (MPICE) application tool;</p> <p>--Delivered recommendations to National Security Presidential Directive 44 (NSPD-44) Knowledge Management (KM) Working Group and Advanced Technology Capabilities Demonstrations (ACTD) to advance whole of government selection of common operating picture and decision-making support tools.</p>					

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<p>Multi-National Experiment 5 (MNE5)</p> <p>-Led an international community of 17 nations, NATO and the European Union in developing a framework to improve coalition partner's ability to conduct interagency and multi-national planning, coordination and execution for contingency operations. Handbooks, architecture, knowledge bases, white papers, and guidebooks were produced, including the following:</p> <ul style="list-style-type: none"> -- A framework for strategic level planning within a coalition; -- A process for multi-national and inter-agency partners to conduct collaborative analysis (assessment), planning, implementation and evaluation for crisis intervention; --An Information Exchange Architecture & Technology Concept describing information exchange mechanisms in order to support coalition operations to include principles for information exchange as well as supporting architecture and potential technologies; --Documentation of the service oriented architecture (SOA) used to support the experimentation events to include the structure and rules for the technical architecture and identification of technical systems capabilities; -- Supported development of a web based common and neutral information sharing platform for all intervention partners, to include non-government organizations; -- A concept providing the theoretical and generic basis for Knowledge Development in support of future operations by creating a comprehensive, systemic and dynamic understanding of the operational environment to improve situational awareness and understanding to the decision makers. <p>Noble Resolve</p> <p>-Supporting USNORTHCOM and interagency, state and local partners in homeland defense and civil support, the Noble Resolve experimentation series completed experimentation in five key lines of effort:</p> <ul style="list-style-type: none"> --Information Sharing – Identified tools, processes, and organizational constructs to enable improved speed, accuracy, completeness, and robustness of information exchange and associated decision-making including: --Familiarized Indiana National Guard personnel with info sharing tools that they have adopted and incorporated into their disaster response to the early summer 2008 flooding crisis in that state; 					

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<p>-- Identified standards and methods that are being adopted to eliminate existing barriers to seamless data sharing between disparate web mapping service tools used by different agencies (DoD, Department of Homeland Security (DHS), etc.);</p> <p>-- Provided feedback on important functionality issues for DHS's Common Operations Picture tool (iCAV) to improve the latest version of this tool suite.</p> <p>--Detect/Identify/Track WMD – Identified for USPACOM tools that could help them detect/identify/track nuclear & radiological WMD materials within their AOR. As a result, they are now better able to advocate for technology projects and programs of record pertinent to their mission set. In addition, helped USPACOM evaluate various C2 arrangements for use when JTF-Elimination is deployed to that AOR.</p> <p>--Population Movement – Enabled Texas and their FEMA Region VI mission partners evaluate their plans and capabilities for handling a large population movement into that region as a result of a natural disaster.</p> <p>--Maritime Domain Awareness (MDA) – Helped National MDA partners evaluate critical aspects of the National MDA CONOPS. Results will help inform any needed CONOPS revisions.</p> <p>--CBRNE Consequence Management Response Force (CCMRF) Sustainment – Created a model that will enable USNORTHCOM and Joint Task Force - Civil Support to identify critical limitations to their ability to sustain a CCMRF once it is deployed in the field.</p> <p>Cooperative Security Joint Operating Concept (JOC)</p> <p>-The Military Contribution to Cooperative Security (CS) Joint Operating Concept (JOC) describes how future Geographic Combatant Commanders and other Joint Force Commanders will contribute to CS in support of strategic objectives. The JOC will be used to guide the development and integration of future military concepts and Joint Force capabilities for conducting CS. The Secretary of Defense approved the concept in September, 2008. USJFCOM is developing experimentation ICW this concept to promote capability development for FY09 execution. This experimentation can be found in the Building Partnerships LOJX.</p> <p>Strategic Communications Joint Integrating Concept (JIC)</p> <p>-The Strategic Communication Joint Integrating Concept (SC JIC) describes how future Joint Force Commanders could plan and execute joint operations to affect the behaviors of selected populations,</p>					

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<p>governments or other decision-making groups to accomplish the mission and promote broader national interests in a socially complex and globally interconnected information environment. It was developed through a series of collaborative workshops with participation across DoD. Capabilities, tasks, and corresponding measures will be examined through a Capabilities Based Assessment (CBA) led by the CBA sponsor to identify gaps and shortfalls. Final version of the concept will be presented to JROC for approval in August 08.</p> <p>Joint Urban Operations</p> <p>-Developed, in collaboration with the Israeli Defense Forces, draft white papers focusing on the following Irregular Warfare topics: Campaign planning for irregular warfare (USSOCOM lead); Winning the influence effort-the role of strategic communications (U.S. Army TRADOC lead); Understanding the operational environment-Employing ISR in complex environments against a hybrid threat (U.S. Army TRADOC lead); Maneuvering in complex environments (USMC lead); Joint Fires in irregular warfare (U.S. Army TRADOC lead).</p> <p>-Joint Urban Warrior 2008 (JUW 08). USJFCOM/USMC co-sponsored Wargame explored and framed Joint Capability coalition and IA relationships necessary to transition from conflict to stability and support operations. Participants included 18 partner nations, OSD, DOS, USAID, Army, Marine Corps, Navy, Air Force, USSOCOM, JIEDDO COIC, students from the Army and Marine Corps Command and Staff Colleges, and academia. Observations and insights from JUW 08 will be incorporated directly into the training pipeline via Mission Rehearsal Exercises and through distribution of the JUW08 interactive battle book.</p> <p>Networked Urban Operations Test Bed Spiral 2 Experiment improved non lethal effects and crowd behavior modeling and simulation capabilities. Improved capability will model crowd responses to directed energy weapons through federated crowd and entity-level models, providing a simulated venue to experiment on and assess the reactions of virtual large crowds (500+ individuals).</p> <p>Irregular Warfare Development Series</p> <p>-Commenced evaluation and experimentation in support of SOCOM to address the capability gaps for conducting irregular activities as described in the 2006 Quadrennial Defense Review and the Irregular Warfare Joint Operating Concept. Key areas of exploration include: Interagency and international</p>					

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<p>partner collaboration; rebalancing Special Operations Forces (SOF) and General Purpose Forces (GPF) to provide effective Train, advice and assist support to international partners; countering violent extremism; and understanding the dynamic irregular threat changes and the operational environment. Analytic reports were produced to enhance the Joint Force Commander's understanding of these challenges and to identify potential solutions to them.</p> <p><i>FY 2009 Plans:</i></p> <p>Deployable Security Sector Reform (Progression of effort from previous year)</p> <p>-Deliver validated deployable security sector reform (DSSR) capability for the combatant commander in order to build partnership capacity in this sector, especially partner-nation national level reform spanning the entire DOTMLPF. Key deliverables include a standardized assessment process for the DSSR to determine partner country requirements; administrative tools to enable DSSR team building, employment and follow-up activities; and prototype organizational structures.</p> <p>-Deliver recommendation for development of DSSR capabilities including validated recommendations for specific DSSR authorities to ensure effectiveness and governance, and viability of using Unit Type Codes.</p> <p>Armed Private Security Contractors (APSC)</p> <p>-Deliver a concept of operations defining the Joint Force Commander's authority for integration, command, control and participation of armed private security contractors in the battlespace during future joint operations and will examine unified action among USG departments and agencies, Joint command and control issues, law of war issues, force providing issues and training/doctrine issues with respect to the integration of PSCs in future conflicts.</p> <p>Coalition Networks</p> <p>-Improve the ability of the Joint Force Commander to integrate with coalition operations, by refining policy requirements and standards for information sharing in a coalition environment.</p> <p>- Improved ability to share decision quality information and knowledge, to include situational awareness, throughout a CTF organization by identifying the processes, tools and organizational structure for Coalition Network Operations.</p>					

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<p>Unified Action</p> <p>-Improve the Joint Force Commanders capability to conduct stability and reconstruction operations with other U.S. government agencies in support of the DOD implementation plan for National Security Presidential Directive-44. FY09 efforts will build on previous work by operationalizing the whole of government planning and implementation processes from the Combatant Commander down to the tactical level. Planned deliverables include:</p> <p>--Identifying and defining the joint force commander's roles and missions for military integration with other US Government departments and agencies in the Interagency Management System, to be codified in a Joint Force Commander's Handbook for Military Participation in the Interagency Management System for Reconstruction and Stabilization.</p> <p>--Developing Joint Force Commander's Handbook's on military support to four distinct sectoral areas in order to identify and define specific military roles and missions in those areas. The sectoral areas include: Rule of Law and Security Sector Reform, Economic Normalization and Restoration, Essential Services and Critical Infrastructure and Governance, Elections, and Media.</p> <p>Multi-National Experiment 6</p> <p>-USJFCOM will lead a multinational partnership to enable coalition efforts to establish and ensure a safe and secure environment, by developing coalition forces ability to share information, gain situational understanding, synchronize efforts and assess progress in concert with interagency partners, international organizations, and other stakeholders when countering activities of irregular adversaries and other non-compliant actors. Key outcomes for this experimentation include:</p> <p>-- Improved ability of coalition forces to synchronize their efforts during operations against irregular adversaries.</p> <p>-- Improved ability of coalition forces to gain shared situational understanding of the operational environment.</p> <p>-- Improved ability to conduct transitions of authorities and responsibilities during complex operations.</p> <p>-- Improved ability to collaboratively develop and implement a shared information strategy focused on relevant populations (regional or transnational).</p>					

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<p>-- Improved understanding of the challenges of assuming responsibility for security and other components of governance and their transfer back to host nation control.</p> <p>-The multinational team will develop a variety of capabilities ranging from overarching framework concepts, functional concepts, enabling concepts, and specific capabilities. These capabilities will cover organizational structure, processes, and tools.</p> <p>Cooperative Security (CS) Experimentation</p> <p>-Conduct CS experimentation focus on providing Geographic Combatant Commanders (GCC's) enhanced abilities to develop CS strategies so that they can more effectively develop and execute regional campaign plans for steady-state activities (as required by the Guidance for Employment of the Force) .</p> <p>Strategic Communication (SC) Experimentation</p> <p>-Experimentation that focuses on Joint Force Commanders enhanced abilities to effectively plan, integrate, conduct and assess Strategic Communication to create, strengthen and preserve conditions favorable to joint operations.</p> <p>Support to USSOCOM Irregular Warfare Experimentation</p> <p>-Experimentation conducted to address 6 challenge areas within the Irregular Warfare (IW) Joint Operating Concept (JOC). This experimentation seeks to identify and vet/validate solutions to the IW challenges. Key outcomes for this experimentation include:</p> <p>-- Interagency and International Partner Collaboration: improving information exchange, decision making and effects among interagency and international partners.</p> <p>-- Special Operations Forces (SOF)/General Purpose Forces (GPF) Rebalance: enhanced understanding of GPF/SOF requirements for IW, focusing on processes and capabilities needed by DoD/ Interagency to train, advise and assist.</p> <p>-- Countering Violent Extremism: enhanced understanding, processes and capabilities to counter the resonance of violent extremist narratives and ideologies.</p>					

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<p>-- Refining the Indirect Approach: enhanced understanding, processes and capabilities for indirect approaches, focusing on the specific interagency and international partner operations, actions and activities that comprise indirect approaches.</p> <p>-- Assessing the Effectiveness of IW Operations: enhanced understanding, processes and capabilities to frame operational environments and gather the appropriate local and regional information to assess effectiveness of IW operations.</p> <p>Interagency Shared Common Operational Picture (IA COP) -Identify technologies, processes, organizational structures, and recommend policy changes that will improve the ability to effectively share decision-focused views of the military, interagency, local and multi-national operational environments.</p> <p>Irregular Warfare Concepts Support (IWCS) -JIC development support to USSOCOM resulting in an operational level description of how the future JFC conducts operations to Defeat Terrorist Networks, how the future JFC conducts Foreign Internal Defense/Counterinsurgency, and how to conduct Unconventional Warfare.</p> <p>Stability Operations JOC (SO JOC) -Collaboration with U.S. military services, the State Department's Office of the Coordinator for Reconstruction and Stabilization (S/CRS), the Office of the Secretary of Defense, US Agency for International Development (USAID), and other USG civilian agencies to assess lessons learned as they relate to the future operating environment, will provide development of a JOC that guides capability development for the JFC to be better postured to effectively conduct Stability Operations under the anticipated conditions of the future security environment.</p> <p>"Hybrid Threat" Experimentation with Israeli Defense Force (IDF Exp) -Commanders handbooks will present lessons learned from the entire experimentation effort conducting distributed operations against a hybrid threat in complex environment. -Potential solutions will be captured in the Irregular Warfare Master Plan for management and integration by the IWC.</p>				

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<p><i>FY 2010 Plans:</i></p> <p>Building Partnership Capacity JIC</p> <p>-Collaboration to produce a concept that will guide capability development, increasing the JFC's ability to assess and enhance partner capacity to provide Host Nation forces capable of thwarting drivers of instability and increasing operating performance with regional partners.</p> <p>Joint Interagency and Multinational Interoperability for Counterterrorism (JIAMNIC)</p> <p>-Improve counterterrorism operational response time and effectiveness in joint, interagency and multinational situations by developing optimal organizational structures, processes and tools to support integrated operations.</p> <p>-Improve counterterrorism operational effectiveness through developing and documenting specific joint, interagency and multinational de-conflicted roles, responsibilities and Concept of Operations.</p> <p>Regional and Local Population Reaction to US Actions</p> <p>-Improve the JFC's capability to adapt ongoing operations for increased mission effectiveness by developing processes, tools and Concept of Operations (CONOPS) for operational and tactical level forces to observe, assess and predict response and reactions of affected regional and local populations.</p> <p>Humanitarian Assistance & Disaster Relief (HADR)</p> <p>-Improve HADR response time and effectiveness in joint, interagency and multinational operations by developing optimal organizational structures, processes and tools to support integrated operations.</p> <p>-Increased HADR operational effectiveness through developing and documenting specific joint, interagency and multinational de-conflicted roles and responsibilities to enable better command and control and implementation planning and execution.</p> <p>Joint Full Spectrum Operational Capability and Capacity</p> <p>-Improve the ability of the JFC to sustain operations across the full range of security threats including Traditional, Irregular, Catastrophic and Disruptive challenges through increased collaboration and integration of Joint, Interagency and Multinational force command and control. The future JFC will be have the ability to simultaneously conduct operations across the range of military operations in the face of the most likely resource constraints.</p> <p>Joint Global Deterrence</p>				

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-Improve the ability of the JFC to deter threats against US national interests using the full range of diplomatic, information, military and economic power through developing processes, tools and Concept of Operations (CONOPS) specifically designed for employment against state and non-state actors .					
<p>Battlespace Awareness (BA)</p> <p>Battlespace Awareness: BA LOJX projects will provide the Joint Force Commander the enhanced processes, concepts and capabilities to coordinate, synchronize and cue surveillance assets and to process, disseminate and integrate the data collected by those assets across the joint force and to interagency/multinational partners in order to enhance the JFC's ability to understand dispositions and intentions as well as the characteristics and conditions of the operational environment that bear on national and military decision-making.</p> <p><i>FY 2008 Accomplishments:</i></p> <ul style="list-style-type: none"> -Produced, with USSTRATCOM's Joint Information Operations Warfare Command (JIOWC), Information Operations (IO) and Joint Intelligence Preparation of the Environment (JIPOE) White Paper J2 as a result of IO/JIPOE Workshops. Paper influenced joint doctrine review of Joint Pub (JP) 2-01.3 (Joint Tactics Techniques and Procedures for Joint Intelligence Preparation of the Battlespace) and JP 3-13 (Information Operations), and provided a framework for the functions and skill sets necessary to support IO within the COCOM Joint Intelligence Operations Centers (JIOC). -Completed initial, priority segments of the Joint Urban Operations (JUO) Capabilities Based Assessment (CBA) which identified capabilities required to provide battlespace awareness in future joint urban operations. Identified potential doctrine, organization, training, material, leadership, personnel, and facilities (DOTMLPF) alternatives to mitigate or eliminate capability gaps. -Improved Joint Information Operations Center (JIOC) operations by identifying the key characteristics, attributes, roles, responsibilities, and authorities which allowed the establishment of common terms of reference and articulation of specific core process elements of the JIOC FT Concept of Operations (CONOP). 	14.533	21.604	25.958		

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<p>-Maritime Domain Awareness (MDA): National Cargo Enterprise Hub Limited Objective Experiments delivered recommendations for refinement of the Cargo Hub and identified procedures to increase joint force commander situational awareness.</p> <p>-Along with OSD, co-chaired the Through The Wall Sensor (TTWS) Focus Team as part of OSD's RADAR Joint Analysis Team (JAT). Defined Focus Team objectives, milestones and deliverables. Recommended future investments in Sense Through Structure (STS) technologies to address military challenges and provided results to the Defense Science and Technology Advisory Group which includes DDR&E and the services. Partners included ONR, DARPA, CERDEC, the Army Program Executive Office (PEO) Soldier, and National Institute of Justice.</p> <p>-Provided Geospatial Analysis and Planning Support (GAPS) software support to units operating in OIF and OEF. GAPS provides the ability to plan and place ISR assets, counter-fire systems, and sensors and can be used to predict likely movement paths through complex terrain. GAPS also supports USAF Force Protection Battle Lab, JIEDDO, and Navy Expeditionary Combat Command mission requirements</p> <p>-Produced an Advanced Analysis White Paper to recommend changes to urban operations intelligence methodology. The advanced analysis methodology produces culturally-specific understanding of the operating environment. The paper is being used as the foundation for an Advanced Analysis Program of Instruction at the US Army Intelligence Center and School at Fort Huachuca, AZ.</p> <p><i>FY 2009 Plans:</i></p> <p>Joint Integrated Persistent Surveillance Network</p> <p>-Improve joint surveillance asset integration, effectiveness and optimization through the refinement of persistent surveillance capability. This capability will enable more effective operations at the Combatant Commander and the Joint Task Force Commander level. Key products will include a baseline assessment of current surveillance capabilities and integration efforts, and the development of a Concept of Operations (CONOPS) for streamlining the tipping, cueing and communication process between collection assets.</p> <p>-Develop methodology to efficiently and effectively combine and apportion sensors in order to optimize persistent surveillance, to include improved all-weather UAV operations.</p> <p>Joint Force Commander Domain Awareness (JFC DA)</p>					

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B. Accomplishments/Planned Program (\$ in Millions)	FY 2008	FY 2009	FY 2010	FY 2011	
<p>-Improved ability for the JFC to visualize, understand and describe actionable information on current and anticipated situations/conditions, and ongoing and planned operations, including operations when the network is degraded or absent.</p> <p>-A systems-level architecture for actionable domain awareness that is tailorable (scalable and filterable as situation/mission-specific decision support criteria demand) including the ability to support tactical/small-unit operations against irregular adversaries.</p> <p>-Defined roles, responsibilities and processes for improved JFC domain awareness of first the maritime, then the air/land/cyberspace domains.</p> <p>Enhanced Urban Reconnaissance (EUR)</p> <p>-The Joint Force Commander will have an enhanced ability to employ existing and near term capabilities to deny enemy use of structures in the urban environment for cover and concealment.</p> <p>-DoD will be able to accelerate promising mid-term capabilities to close vital gaps in Joint Force Commanders' ability to deny enemy use of structures in the urban environment for cover and concealment.</p> <p>Global Positioning System (GPS) Sustainability</p> <p>-Improved ability to sustain military operations facing GPS degradation due to jamming and spoofing.</p> <p>DoD will be able to accelerate promising mid-term capabilities to close vital gaps in the JFC's ability to conduct joint operations when GPS is degraded or lost.</p> <p>Joint Counterintelligence and Human Intelligence Improved Integration (JCHI2)</p> <p>Refine and develop common processes for the integration of Counterintelligence/Human Intelligence operations.</p> <p><i>FY 2010 Plans:</i></p> <p>-FY 10 projects will be developed based on Enterprise Warfighter Challenges collected initially in early FY09 and refined in early FY10.</p>					
Command and Control (C2)	18.474	17.389	27.040		
Command and Control: C2 LOJX projects will provide the Joint Force Commander the ability to exercise authority and direction over assigned and attached forces and resources in the accomplishment of the					

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<p>mission and to share information with higher, adjacent and subordinate headquarters quickly and reliably in order to ensure interoperability and operational agility.</p> <p>The JFC, facing commitment of forces to fight a thinking enemy, must be confident he or she understands the operational environment and can visualize, describe, or direct necessary actions in a timely, trusted fashion.</p> <p><i>FY 2008 Accomplishments:</i></p> <ul style="list-style-type: none"> -Coordinated, developed, prioritized, and transitioned Noble Resolve experimentation campaign potential solutions in support of NORTHCOM. Experimentation addressed the active layered defense for the Homeland; the National Incident Management System (NIMS) and National Response Framework (NRF) were used as part of the context. -Demonstrated the capability of the cross domain text chat tool on operational networks with the participation of the Cross Domain Collaborative Information Environment (CDCIE) in the Joint Expeditionary Force Experiment at Langley AFB. CDCIE, a FY08 Joint Capability Technology Demonstration, allowed text chat between users on SIPRNet terminals and a SECRET level coalition network. CDCIE experimentation/demonstration is complete; no further JE investment will be committed. -Addressed the Critical Operational Issues (COI), measures of performance (MOP) and measures of effectiveness (MOE) to define systems capabilities and military utility of the Theater Effects-Based Operations (TEBO) operational planning tool suite Advanced Concept Technology Demonstration (ACTD) through a limited military utility assessment at Exercise Ulchi Freedom Guardian 07. Additionally, collected, identified and generated information to develop a DOTMLPF Change Recommendation (DCR) and gathered data on operational processes to share with COCOMs and operational requirements for future versions of the TEBO tool suite. -Provided support to COMISAF with a Field Experiment and Operational Support characterized by providing products and services to HQ ISAF staff elements. This unique one-year process provided operational support to a war fighting headquarters using experimental capabilities while simultaneously evaluating the value of those capabilities to the war fighter in real time. COMISAF Project Submission Request for Decision Support Tools was received by the SHAPE J5 Capability Management Directorate on 1 Apr 08. 					

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<p>-Identified the need for combatant commands to identify U.S. and coalition command and control (C2) systems that will be used for the JTF-Elimination (JTF-E), which addresses need for eliminating WMD to effectively integrate and operate.</p> <p>-Improved the ability of the Joint Force commander to share information with multi-national partners, improving the ability of U.S. forces to effectively communicate and collaborate with allies and coalition partners by developing documentation reports, approval letters, assessment plans, and reports for Cross Domain Collaborative Information Environment JCTD.</p> <p><i>FY 2009 Plans:</i></p> <p>Capstone Concept for Joint Operations (CCJO)</p> <p>-Conduct a three-phased (prepare, execute, and assess) examination of the programmed force by looking at it in the context of the Capstone Concept for Joint Operations (v.3) to identify gaps in capability and capacity of the joint force's ability to meet the challenges of the future operating environment.</p> <p>-Improved understanding of the broad capabilities needed to optimize joint effectiveness and successfully execute joint operations in the projected future security environment.</p> <p>-Identification of capability gaps and proposed options that would balance the joint force to successfully execute combat, security, relief & reconstruction, and engagement joint operations in the projected future security environment.</p> <p>Joint Force Commander Command and Control</p> <p>-Improve the JFC's ability to identify, assess, refine and validate C2 architectures, processes and toolsets that are standards-based, geographically distributed and scalable to include operations in a degraded or no-network conditions.</p> <p>-Improve integration between JFCs and National Headquarters, while harmonizing operations with interagency, multi-national, host nation and other Joint Force partners.</p> <p>-Improve C2 framework for centralized and decentralized decision making to facilitate subordinate commander's initiative and aggressiveness and increase C2 resiliency.</p> <p>.</p> <p>Joint Distributed Operations</p>					

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<p>-Identify and refine command and control processes and structures (to include over-the-horizon, beyond line-of-sight and on-the-move) and the enabling capabilities necessary to support distributed operations and enable decentralized execution of joint fires and maneuver.</p> <p>-Improve JFC and subordinate commander's ability to share situational awareness of the battlespace enabling both a better understanding of commander's intent and a detailed knowledge of the operating area.</p> <p>Planning, Assessment and Decision Support Systems (PADSS)</p> <p>-Experimentation to enhance decision-aiding technologies and software applications that facilitate rapid and effective operational planning, decision-making, execution and dynamic assessment of combined and joint operations.</p> <p><i>FY 2010 Plans:</i></p> <p>Global C2</p> <p>-Improve the JFC's operational effectiveness in joint, interagency and multinational operations by developing architectures, organizational structures, processes and tools to support integrated operational activities including: assessment, situational awareness, planning and execution, resulting in developing and documenting specific joint, interagency and multinational de-conflicted roles, responsibilities and Concept of Operations.</p> <p>Maritime Dynamic Targeting</p> <p>-Improve operational effectiveness of maritime fires operations through development of decision support systems that will enable accurate and timely joint/cross-service fires.</p> <p>-Improve effectiveness of maritime targeting through developing optimal organizational structures, processes, tools and Concept of Operations (CONOPS) to support the integration of maritime forces in the joint fires environment.</p> <p>Maritime Crisis Response</p> <p>-Assess current capabilities and requirements to improve integration of USCG forces into the joint force command and control structure for maritime homeland defense, define specific capability gaps in terms of</p>					

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<p>expected JFC missions over the near, mid and far term horizons as well as generate/identify and validate potential solutions across the range of DOTMLPF-P domains.</p> <p>Airspace Complexity</p> <p>-Improve current capabilities and command and control requirements to conduct all weather, around-the-clock, operations while de-conflicting multiple sources of activity including: military aircraft, potentially hostile aircraft, commercial / civil aircraft, a wide variety of UASs, short-range artillery and ballistic cruise missiles.</p> <p>Space Operations</p> <p>-Improve the GPS and SATCOM jamming resistance by identifying and assessing current and near-term vulnerabilities, identification of technology solutions and developing processes, tools and Concepts of Operations (CONOPS) specifically designed to minimize or eliminate vulnerabilities.</p> <p>-Improve the effectiveness of space force assets by developing optimal organizational structures, processes, and tools to support integrated operations.</p> <p>Distributed Operations</p> <p>-Develop an operational level description of how the future Joint Force Commander conducts: operations to Defeat Terrorist Networks; Foreign Internal Defense (FID) and Counterinsurgency (COIN); Unconventional Warfare (UW).</p>					
<p>Force Application (FA)</p> <p>Force Application: FA LOJX projects will provide the Joint Force Commander the ability to integrate the use of maneuver and engagement in all environments to create the effects necessary to achieve mission objectives.</p> <p><i>FY 2008 Accomplishments:</i></p> <p>-Joint Urban Fires Prototype (JUF-P). Improved joint forces' ability to deliver precision fires in a decentralized manner and in less time than traditional centralized processes. Demonstrated, in a field application, the Joint Urban Fires Prototype (JUFP), expanded target mensuration capability for tactical ground units. Improved joint fires C2 integration and TTPs incorporating automated collateral damage estimation modules into fires systems. Specific products include:</p> <p>-- An Advanced Field Artillery Tactical Data System (AFATDS) Effects Management Tool (EMT);</p>			8.386	15.486	18.387

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<p>-- Provided precision coordinate generation capability down to the company level. Demonstrated integration of the Digital Precision Strike Suite Scene Matching (DPSS-SM) and Precision Strike Suite - Special Operations Force (PSS-SOF) into Army and USMC fire support team Light Weight Forward Entry Device (LFED);</p> <p>-- Provided precision coordinate generation capability to dismounted operators. Integrated Precision Fires Image (PFI) into commercial handheld devices (lightweight/economical) and into the Pocket-sized Forward Entry Device (PFED)(Army and USMC Program Of Record (POR)) for precision coordinate generation by dismounted operators;</p> <p>--Codified training certification requirements for operators of automated precision coordinate tools by revising CJCS Instruction 3505.01;</p> <p>--Developed a training program of instruction for operators of automated precision coordinate tools;</p> <p>--Developed third party targeting tactics and techniques and procedures (TTP) for employment of Tactical Tomahawk cruise missiles for integration into the Air, Land and Sea Time Sensitive Target multi-service TTP;</p> <p>--Evaluated the specific gaps in employing airborne platform precision coordinate generation to enhance close air support (CAS) capabilities, including field testing of commercial handheld devices in Navy/ USMC air wing CAS and JTAC training.</p> <p>-Standoff Non-Lethal Weapons (NLW) Technology Assessment. Assessed joint requirements and solutions for stand-off non-lethal weapons to stop vehicles, clear buildings, and control crowds, and recommended actions to develop these capabilities. Results provided to Joint Non Lethal Weapons Directorate (JNLWD) and other NLW stakeholders including services, combatant commands, and industry to shape NLW investments. Assessment findings influenced the design of FY08 Directed Energy Weapons and Crowd Modeling experimentation.</p> <p>-Non-Lethal Building Clearing Requirements. Developed and documented ground combat requirements for clearing structures from stand-off distances using non lethal weapons. The work defined the requirements for DDR&E Clear Space Challenge and the FY09 Joint Non Lethal Weapons Program (JNLWP) Technology Broad Area Announcement (Non-Lethal Weapons FY09 Applied Research Efforts).</p> <p><i>FY 2009 Plans:</i> Conventional Warfare (CW) Joint Operating Concept (JOC)</p>					

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<p>-Develop a conventional warfare joint operation concept that guides capability development for the JFC to be better postured to effectively conduct conventional warfare under the anticipated conditions of the future security environment.</p> <p>Counter-Personnel Warning and Suppression Systems</p> <p>-Identify current and near-term capabilities and develop / validate TTPs to apply escalation-of-force options to employ non-kinetic and non-lethal capabilities to hail, warn, suppress and deny individuals at stand-off ranges on land and in the maritime environment.</p> <p>Cyberspace Operations</p> <p>-Develop and refine concepts and capabilities for joint cyberspace operations focused on developing and improving collaborative planning capabilities, describing and assessing intelligence support requirements, evaluating and refining measures of performance and effectiveness, organizational structure, and identifying and assessing authorities and legal considerations.</p> <p>-Improve the joint forces capability to conduct cyberspace operations with emphasis on integrating and synchronizing computer network attack, defense and exploitation. The joint force will have an improved capability to counter transnational, adaptive and networked adversaries by integrating direct and indirect actions within the information environment, including the internet.</p> <p>Assured Air Access (AAA)</p> <p>-Improve the joint forces ability against the adversarial use of advanced weapons systems capable of disrupting airspace operations using current and near term capabilities. Capabilities will be evaluated to enable DoD to accelerate their development to close vital gaps in the JFC's capabilities.</p> <p><i>FY 2010 Plans:</i></p> <p>Collateral Damage</p> <p>-Improve JFC capability to conduct offensive operations in areas and environments where collateral damage is unacceptable by assessing and identifying precision strike sensors, weapons, and developing processes, tools and Concept of Operations (CONOPS) specifically designed to minimize or eliminate collateral damage</p> <p>Prompt Global Strike</p>					

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<div>-Improve the operational response time and effectiveness in executing worldwide strategic and operational strike missions by developing optimal organizational structures, processes and tools to support joint operations.</div> <div>-Increase the operational effectiveness of global strike missions through improved intelligence by developing and documenting specific joint and service de-conflicted roles, responsibilities and Concept of Operations.</div> <div>Forcible Entry</div> <div>-Improve the surface and air distribution capability to ensure the rapid precise sustainment to support the unimpeded maneuver and engagement capability of the Joint Force</div> <div>Clandestine Ground Mobility for Air-Inserted Forces</div> <div>-Conduct experimentation to decrease the time required to field an effective clandestine ground mobility capability through identification of mid-term technological solutions that can be accelerated to fill gaps in the current array of petroleum-based ground vehicles.</div> <div>-Improve the capability to adapt existing doctrine and procedures for clandestine ground mobility requirements by developing processes, tools and Concept of Operations (CONOPS) specifically tailored for use by air-inserted forces.</div> <div>Operational Maneuver from Long Distance</div> <div>-Assess of current capabilities and requirements for operational maneuver from both strategic and intra-theater distances to sustain tactical forces at the point of need, define specific capability gaps in terms of expected JFC missions over the near, mid and far term horizons and identify/generate and validate potential solutions across the range of DOTMLPF-P domains.</div>					
Logistics (Log) Logistics: LOG LOJX projects will provide the Joint Force Commander the ability to project and sustain a logistically ready joint force through the deliberate sharing of national and multi-national resources to effectively support operations, extend operational reach and provide the joint force commander the freedom of action necessary to meet mission objectives.		14.610	6.629	5.408	

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<p><i>FY 2008 Accomplishments:</i></p> <p>-Drafted DOTMLPF Change Recommendation (DCR), Operationalizing Joint Logistics. Using the Joint Experiment Deployment and Support (JxDS) program in coordination with US Forces, Korea, and the DCR provides the required joint logistics capabilities and organizational options that a commander may utilize to effectively support joint operations.</p> <p>-Multinational Experiment 5 (MNE5) Logistics developed and validated a methodology to expand NATO Information Exchange Requirements. The NATO Information Management Group adopted the methodology as the baseline for integrating both legacy and future information systems under the NATO Logistics Functional Services Capability Package and to guide development of a NATO Logistics Common Operational Picture (LCOP). Drafted the initial version of a multinational coalition logistics guide supporting a civilian-led, comprehensive approach to humanitarian assistance and disaster relief Operations.</p> <p>-U.S. Korea Command (USKORCOM) Transformation: Produced the methodology to develop the Korean theater logistics concept supporting operations to be adopted for 2012. Developed a conceptual logistics framework for the KORCOM J4 organization with its new roles and responsibilities. Completed gap analysis to indentify capabilities to be developed that will optimize, synchronize and coordinate joint theater logistics in the Area of Responsibility.</p> <p>-U.S. Central Command (USCENTCOM): Conducted baseline assessment of theater-specific logistics support processes and began a systematic review/modification of Global Combat Support System processes to develop a logistical common operating picture. Supply class III (fuel) and class V (ammo) were the first two commodities identified for improvements with the DoD IT logistics architecture. Supported CENTCOM J4 with an initial assessment regarding how to structure an enhanced Theater Support Command (eTSC) to effectively manage joint logistics for the AOR.</p> <p>-U.S. Special Operations Command (USSOCOM): Developed a special operations logistics support methodology and framework concept to synchronize strategic and operational level logistics activities for Geographical Combatant Commands (GCC) and their components. This newly developed logistics</p>					

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<p>support methodology will improve the GCC Theater Special Operations Command's (TSOC) ability to effectively plan, execute, and integrate logistics at the operational level for irregular warfare.</p> <p>-- Documented the "As-is" TSOC organizational construct and logistical requirements to determine gaps, redundancies, and shortfalls to allow faster identification of theater irregular warfare logistics requirements and to improve capability to direct theater logistics resources through FY09-10.</p> <p>-U.S. Southern Command (USSOUTHCOM): Enhanced joint logistics support, provided a baseline assessment of theater specific, conventional logistics (J4) roles and responsibilities and developed a joint interagency logistics element (Director for Logistical Support) coordinated and in accordance with a 1 May 08 provisional organization construct directed by CDRUSSOUTHCOM.</p> <p>-- Assisted in reorganization of the logistics directorate in preparation for FY 09/10 final implementation as SOUTHCOM transitions to become Joint Interagency Security Command South (JIASC-S). This reorganization effort will adapt and expand to include an examination of rules, tools, and processes required to provide logistics support within an interagency logistics directorate.</p> <p><i>FY 2009 Plans:</i></p> <p>US Central Command (CENTCOM) Joint Logistics Transformation</p> <p>-Develop a modified Global Combat Support System-Joint (GCSS-J) that provides the required strategic and operational level logistics information and a USCENTCOM Joint Logistics Common Operational Picture (JLOGCOP) that will enable the joint logistics organization to monitor, evaluate and execute seamless end-to-end logistics support to all activities in the USCENTCOM Theater. Develop a conceptual framework for a theater-wide operational level Joint logistics construct, designed around a Service-based (Army TSC) that will coordinate, integrate and synchronize theater logistics.</p> <p>-Provide planning assistance and subject matter expert (SME) support to MNF-I (DC, R&S) to design an optimal J4 logistics directive (staff section) to support the future merger of the MNF-I and MNC-I into a CJTF-I J4 staff.</p> <p>US Korean Command (KORCOM) Transformation</p> <p>-Support the modification of the current Korea Theater of Operations Joint Logistics construct to accommodate the new supporting to supported relationship between KORCOM and Republic of Korea forces. This will include the development of an enhanced J4 organization and the redistribution of the</p>					

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<p>required Joint Logistics capabilities between it and the current Joint Force Component Support Command (JFSCC) as well as integration into the PACOM Joint Logistics construct.</p> <p>-To more effectively support joint operations, develop the concept of support for KORCOM and identify the required capabilities and enabling rules, tools, and processes to include the requirements for supporting IT development.</p> <p>US Special Operations Command (USSOCOM) Joint Special Operations Warfighting Support Capability (JSOWC)</p> <p>-Develop a single Special Operations C2 Joint Logistics Support Capability with supporting rules, tools and processes that provides synchronization of strategic and operational-level logistics activities at the combatant command and component levels.</p> <p>-Faster identification of theater SOF log requirements and shortfalls.</p> <p>-Improved capability to direct theater and allocate logistics resources and more effectively adjudicate conflicting priorities.</p> <p>US Southern Command Joint Interagency Security Command South (JIASC-S))</p> <p>-Identify specific Interagency logistics enabling rules, tools, and processes that require integration to enhance SOUTHCOM's larger operational level logistics capabilities.</p> <p>-Develop a Joint & Interagency Logistics Integration Concept of Operations (CONOPS) to provide the broad framework within which Joint and Interagency logistics capabilities will be integrated.</p> <p>Multinational Experimentation (MNE) 6 - Logistics</p> <p>-Conduct experimentation on the beta NATO Logistics Functional Area System (LOGFAS) which will become the logistics system of record to support the International Security Assistance Force (ISAF) in Afghanistan, leading to more efficient logistics and sustainment support to both irregular and conventional military operations via improved logistics information sharing between the partner nations and the combined force commander, and Standardized multinational logistics user guidance and system standards to ensure logistics information system interoperability among multinational partner nations.</p> <p>Seabasing</p>					

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<p>-Provide DOTMLPF-P recommendations for overcoming or mitigating identified gaps to enable effective Joint Seabasing capabilities by conducting in-depth analysis of all FSA#2 associated gaps, as identified through the Joint Seabasing Analysis and Wargaming (JSAW) Phase II campaign modeling of the approved MCO 2024 scenario</p> <p><i>FY 2010 Plans:</i> Advanced Air Refueling -Assess current and future requirements in order to improved the effectiveness, range and time-on-station of air refueling operations through the assessment and identification of near term technologies and the associated processes, tools and Concept of Operations (CONOPS) required to implement advanced air refueling techniques including process automation and protection against directed energy threats. Autonomous Landing Guidance -Improve joint force projection capability by assessing current capabilities and requirements to conduct humanitarian relief operations on a global scale regardless of weather conditions and navigation aid infrastructure, defining specific capability gaps in terms of expected JFC missions over the near, mid and far term horizons and identifying/generating and validating potential solutions across the range of DOTMLPF-P domains.</p>				
<p>Net Centric</p> <p>Net – Centric: NC LOJX projects will provide the Joint Force Commander a framework for full human and technical connectivity and interoperability that allows all users and mission partners to share the information they need, when they need it, in a form they can understand and act on with confidence, and deny access to our adversaries.</p> <p><i>FY 2008 Accomplishments:</i> Cyber Ops LOJX was established mid-FY 08; JCD&E Enterprise continued Cyber Ops as an FY09 LOJX due to successful experimentation to date and its increasing importance. -Co-authored Information Operations (IO) and Joint Intelligence Preparation of the Environment (JIPOE) White Paper, with USSTRATCOM's JIOWC J2. Additionally, it influenced the revision of JP 2-01.3 (Joint Tactics Techniques and Procedures for Joint Intelligence Preparation of the Battlespace) and JP 3-13</p>	8.209	0.000	0.000	

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<p>(Information Operations), and provided a framework for the functions and skill sets necessary to support IO within the COCOM Joint Intelligence Operations Centers (JIOCs). Once approved, the white paper will be distributed through DUSD (WS) IO & SS to inform COCOM JIOCs of the higher fidelity intelligence and information needs required to support information operations</p> <p>-Developed scenarios to assist AFRICOM with analysis of its staff structure and processes during its initial operational capability. Specific JIOC enabling themes identified to support USAFRICOM's staff training process were knowledge management and information sharing.</p> <p>-Expanded the concept of Cross Functional Fusion Cells (CFFC) from the tactical echelon and developed concepts and approaches in the writing of a white paper and pamphlet to detail the principles of the tactical level success, and provide the basis/foundation for extending those appropriate and relevant attributes to higher command echelons conducting military and/or civil support operations. The paper and pamphlet examined the underlying principles of Iraq Fusion Cells to determine core attributes and identify under what conditions a CFFC is appropriate and how its function differs from working groups, tiger teams, and other traditional approaches.</p> <p><i>FY 2009 Plans:</i></p> <p>-No projects are specific to NC. Several projects in the other LOJX sections are secondary, to include: Joint Force Commander Domain Awareness; Cyberspace Operations; Multinational Experiment 6; "Hybrid Threat" Experimentation with Israeli Defense Force; Joint Force Commander Command and Control; Coalition Networks; Multinational Experiment 6 Logistics; Interagency Shared Common Operational Picture; Joint Distributed Operations</p> <p><i>FY 2010 Plans:</i></p> <p>Space Vulnerabilities</p> <p>-Improve the ability of the JFC to monitor, identify, prevent and react to security threats against space systems and assets through improved sensor capabilities, architectures, command and control systems and information sharing specifically tailored to the space environment, as well as with denied or degraded access to space assets or systems.</p> <p>Distribution Network Analysis</p>					

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<ul style="list-style-type: none"> -Improve the JFC's capability to conduct offensive and defensive vulnerability analysis of critical infrastructures by developing and analyzing distribution network models of critical infrastructure sectors. -Improve the JFC's capability to protect or target select infrastructure sectors by identifying critical nodes and links. -Improve the JFC's capability to identify and predict cascading effects of induced network faults in a single critical infrastructure sector or in multiple interrelated sectors. Information Collaboration and Integration <ul style="list-style-type: none"> -Improve the ability of the JFC to prevent or react to conflict or civil strife through increased integration of joint, interagency and multinational force assessment frameworks for determining drivers of conflict and instability. 					
Protection (P) Protection: P LOJX projects will provide the Joint Force Commander the ability to prevent/mitigate adverse effects of attacks on personnel (combatant/non-combatant) and physical assets of the United States, allies and friends. <i>FY 2008 Accomplishments:</i> New LOJX in FY09. Previously reported under Countering Weapons of Mass Destruction (CWMD) LOJX. <i>FY 2009 Plans:</i> Combating Weapons of Mass Destruction – Radiological/Nuclear (CWMD-RN) Detection and Disablement <ul style="list-style-type: none"> -Improve the Joint Force Commander's ability to detect and characterize radiological and nuclear materials (RN) by proposing a holistic enhanced systems approach employing current and near term detection technologies (sensors), augmented by effective use of non-sensor capabilities (intelligence, info-sharing and fusion, predicative analysis, etc), to enhance the ability to detect, track and identify such materials. -Analyze and experiment with mid-term technological solutions that could be accelerated to fill vital gaps in the current proposed enhanced systems approach to RN detection. 			1.108	6.743	6.489

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<p>Combating Weapons of Mass Destruction (Biological (CWMD BIO)</p> <p>-Improve the Joint Force Commander's ability to detect and characterize biological materials by proposing a holistic systems approach, employing current and near term technologies, augmented by effective use of non-sensor capabilities (intelligence, information sharing, predictive analysis, etc.) to improve the ability to detect, locate, characterize (and establish attribution), interdict and eliminate/render safe biological pathogens to prevent their use by irregular adversaries.</p> <p>-Analyze and experiment with mid-term technological and/or organizational solutions identified for acceleration/implementation to fill capability gaps in detection, localization and characterization of sophisticated and/or genetically engineered biological pathogens.</p> <p>Global Integrated Air and Missile Defense (GIAMD)</p> <p>-Analyze current capabilities and gaps regarding GIAMD, including cruise missile, ballistic missile, manned and unmanned air vehicle threats, and identify/refine C2 architectures, processes and information sharing requirements for effective GIAMD and coordination between theater, national, and coalition partners.</p> <p><i>FY 2010 Plans:</i></p> <p>-Plan for infrastructure Anti-Terrorism Project to improve the ability of the JFC to collaborate and integrate operations with federal, state and local agencies to protect critical homeland infrastructure and maintain essential services when threatened by terrorist networks. The JFC will have enhanced interagency, all domain, all hazard fusion center for suspicious activity reporting, indications and warning, analysis, fusion and broadcast warning dissemination.</p> <p>Ballistic Missile Defense</p> <p>-Conduct experimentation and analysis to improve the JFC's decision and reaction timelines responding to ballistic missile threats, to determine optimal command and control architectures, procedures and technologies, increasing the effectiveness of ballistic missile defense through assessing and identifying precision sensors, weapons and developing processes, tools and CONOPS specifically designed to minimize or eliminate ballistic missile threats.</p>					
Joint Urban Operation (JUOO)/ Irregular Warfare Center (IWC)			6.614	5.038	5.189

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<p>Joint Urban Operations – JUO LOJX projects will provide the Joint Force Commander with the ability to lead, coordinate, and integrate the urban operations doctrine, organization, training, and equipment activities of the DOD Components to improve and transform the capabilities of joint forces in conducting urban operations over the full range of urban contingencies. The IWC leads and directs the integrated USJFCOM approach with DoD, Multinational and Interagency partners for Joint Force Irregular Warfare (IW) concept development, training, integration, doctrine development, and experimentation to ensure Joint Forces IW capabilities meet Combatant Commander campaign and complex contingency requirements.</p> <p><i>FY 2008 Accomplishments:</i></p> <p>Irregular Warfare Development Series</p> <p>-Commenced evaluation and experimentation in support of SOCOM to address the capability gaps for conducting irregular activities as described in the 2006 Quadrennial Defense Review and the Irregular Warfare Joint Operating Concept. Key areas of exploration include: Interagency and international partner collaboration; rebalancing Special Operations Forces (SOF) and General Purpose Forces (GPF) to provide effective Train, advice and assist support to international partners; countering violent extremism; and understanding the dynamic irregular threat changes and the operational environment. Analytic reports were produced to enhance the Joint Force Commander's understanding of these challenges and to identify potential solutions to them.</p> <p>Joint Urban Operations</p> <ul style="list-style-type: none"> • Developed, in collaboration with the Israeli Defense Forces, draft white papers focusing on the following Irregular Warfare topics: Campaign planning for irregular warfare (USSOCOM lead); Winning the influence effort-the role of strategic communications (U.S. Army TRADOC lead); Understanding the operational environment-Employing ISR in complex environments against a hybrid threat (U.S. Army TRADOC lead); Maneuvering in complex environments (USMC lead); Joint Fires in irregular warfare (U.S. Army TRADOC lead). • Joint Urban Warrior 2008 (JUW 08). USJFCOM/USMC co-sponsored Wargame explored and framed Joint Capability coalition and IA relationships necessary to transition from conflict to stability and support operations. Participants included 18 partner nations, OSD, DOS, USAID, Army, Marine Corps, Navy, 					

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<p>Air Force, USSOCOM, JIEDDO COIC, students from the Army and Marine Corps Command and Staff Colleges, and academia. Observations and insights from JUW 08 will be incorporated directly into the training pipeline via Mission Rehearsal Exercises and through distribution of the JUW08 interactive battle book.</p> <ul style="list-style-type: none"> • Networked Urban Operations Test Bed Spiral 2 Experiment improved non lethal effects and crowd behavior modeling and simulation capabilities. Improved capability will model crowd responses to directed energy weapons through federated crowd and entity-level models, providing a simulated venue to experiment on and assess the reactions of virtual large crowds (500+ individuals). <p><i>FY 2009 Plans:</i></p> <p>Irregular Warfare Center Joint Urban Operations Science & Technology (IWC JUO S&T)</p> <ul style="list-style-type: none"> - Urban operations capability gaps associated with sensors, weapons, C2 systems and other equipment shortfalls are mitigated through the identification, assessment, and transition and fielding of appropriate solutions, or through the direct integration of associated requirements into existing Service or agency programs. - Realistic urban testing and experimentation venues and systems are available to enable rapid and effective assessment of emerging urban operations-related concepts, technologies and tactics, techniques and procedures by the Services, agencies and combatant commands. <p>Irregular Warfare Center Joint Urban Operations Quick-Turn Capabilities-Based Assessment (CBA), Irregular Warfare Master Plan, Functional Solutions Analysis (FSA) Integration</p> <ul style="list-style-type: none"> - CBA: Identification of the Joint Urban Operations (JUO)-unique capability gaps within the JUO Joint Integrating Concept (JIC) 12 required capabilities, and production of Joint Capability Integration & Development System (JCIDS) documentation sufficient to achieve transition to FSA. - Master Plan: Overarching strategy that provides context and direction to JFCOM DOTMLPF-P initiatives related to IW. - FSA Integration: Greater integration and effectiveness, and potentially reduced redundancy, of DoD JCIDS activities that seek to address critical IW and JUO capability shortfalls. <p>Joint Urban Operations Geospatial Analysis Planning Support (GAPS)</p>					

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<ul style="list-style-type: none"> - Mission planning toolset that provides the military planner with the ability to rapidly analyze terrain and resulting sensor coverage for multiple, diverse sensor systems in both complex and urban terrain. - Transition GAPS joint integrated capabilities to Service programs of record, and sustain warfighter capability/support <p>Joint Urban Warrior (JUW) 09</p> <ul style="list-style-type: none"> - The JFC executing will understand complexities associated with shaping. - The JFC will understand Enhanced Capability Team (ECT) resources that will benefit the joint force during shaping. - The organizations involved in transition will possess the information required to develop a global perception management policy. <p>Small Unit Decision Making Limited Objective Experiment (LOE)</p> <ul style="list-style-type: none"> - Identify how warfighters make decisions under stress and what is learned during the initial firefights that drastically increase life expectancy, leading to the transfer of results to Service programs of record - the impact of cognitive, physical and moral decision making process and provide empirical data to facilitate the development of realistic combat training environments for live, virtual and constructive (LVC) training/ decision making. <p><i>FY 2010 Plans:</i></p> <ul style="list-style-type: none"> -Objectives (due to the dynamic nature of the Urban Operations Environment and Irregular Warfare specific projects and focus areas are subject to fringe changes): - In concert with the Joint Urban Operation and Irregular Warfare community, continued development, articulation and refinement of DOD Joint Urban Operations Roadmap, as a comprehensive document describing DoD's approach to lead, coordinate, and integrate urban operations doctrine, organization, training, and equipment that improve and transform the capabilities of Joint Forces for conducting urban operations. Outcome: DoD Master Plan for Joint Urban Operations - Advancement of S&T integration focuses on specific efforts to eliminate or mitigate shortfalls by identification, assessment, transition and fielding of appropriate solutions or through direct integration of associated requirements into existing Service or agency programs. Outcomes: Improved integration, 					

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<p>coordination and synchronization of sensor, command and control and fires capabilities needed for effective operations. Improved testing and experimentation capabilities to assess urban operations concepts, technologies and TTPs.</p> <p>- Leveraging a partnership with the Joint Unmanned Ariel System Center of Excellence (JUAS COE), Assessment of current and planned efforts to employ DoD unmanned aircraft systems (UAS) capabilities for Foreign Internal Defense and Influence Operations, that enhances the overall capability of the DoD in execution of operations in the Urban Environment. Outcomes: UAS FID and Influence Operations Assessments and Execution Strategies</p> <p>- Improve the DoD Test and Evaluation Strategic Plan for the urban environment. Work across the DoD to ensure that we effectively represent the nuanced challenges realized in the Urban Environment across the Test and Evaluation community. Outcomes: Improved replication of the Urban Environment for T&E, that results in better understanding and risk assessment in the system development process.</p> <p>- Continued advancement of warfighting systems that have improved functionality and applicability in the Urban Environment. Leverage ongoing developmental efforts across the DoD and partner nations, to identify and advance capabilities. Outcomes: Assessment of various capabilities for suitability in the Urban Environment.</p> <p>- In partnership with Army TRADOC, AMSAA, JNLWD, VMASC and JFCOM J7, pursue improved M&S capabilities related to the urban environment, including the population, terrain and infrastructure. Outcomes: Military-Crowd interaction case studies focused on regions of interest. Improved crowd and population models that support urban-related training, analysis and experimentation.</p>				
<p>Collaboration Gateway</p> <p>Gateway to allow on-going discussions with all the Combatant Commands, Military Services and Defense Agencies on experimentation needs, priorities and work plans.</p> <p><i>FY 2009 Plans:</i></p> <p>Gateway to allow on-going discussions with all the combatant commands, military services and defense agencies on experimentation needs, priorities and work plans.</p>	0.000	1.200	0.000	

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<p>Joint Futures Group</p> <p>The Joint Futures Group (JFG) is a unique entity within Joint Forces Command that integrates "future thinking" and provides a "skunk work" like environment within which to generate innovative ideas about future challenges and military implications for JFCOM and the DOD. The JFG is the command's team to identify the next big challenges or opportunities for the joint force that are not being addressed elsewhere in DoD.</p> <p>The joint force commander requires clarity on the trends, contexts, challenges and opportunities in the complex joint operating environment that are likely to be encountered in the next several decades. Specifically for JFCOM, JFG provides a dedicated group outside the mainstream command effort to search for and identify big challenges or opportunities that are not being addressed elsewhere in DOD. Furthermore, this group should integrate this futures research into other more mainstream evolutionary command processes.</p> <p>Provides research on the futures environments to Joint Experimentation and the Joint Irregular Warfare Center for concept development and to provide the basis for experiment scenarios.</p> <p>The mandate of the Joint Futures Group is to provide a vision of the future as it pertains to implications for the joint force by collecting, synthesizing and disseminating the world's strategic and international relations futures efforts. It accomplishes this through the Joint Operating Environment (JOE) project and the by continually enriching the DOD analytical agenda. The JOE effort is the written future problem statement for the Capstone Concept for Joint Operations (CCJO) as directed by the Joint Chief of Staff Chairman and is intended to inform the JOC and Joint Integrating Concepts and functional concepts as well as to provide a framework to experiment with those concepts through its vision of the future. Our support to the analytical agenda consists of improving and refining the Defense Planning Scenarios (DPS) and ensuring that the DPSs reflect a more balanced set of irregular and hybrid warfare challenges.</p> <p><i>FY 2008 Accomplishments:</i></p> <ul style="list-style-type: none"> • Produced the Joint Operating Environment (JOE) • Conducted multinational and international conferences • Conducted red-teaming to support joint concept development and experimentation scenarios 			1.100	0.000	1.133

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<ul style="list-style-type: none"> • At NORTHCOM's request provided keynote futures brief, and participated in all of the NORTHCOM Homeland Defense / Civil Support Limited Objective Experiment (LOE). • Published Trend Papers/Articles: To support COCOM and Service concept development, research and publish focused trend papers that identify key trends of the present or future. <ul style="list-style-type: none"> - "JOE and CCJO Implications for Future Joint Force Readiness" - "Identity based Conflicts over Global networks" - "Iran: Energy and Instability" - "Open Source Warfare" - Articles for Publication: JFQ, Marine Corps Gazette <p><i>FY 2009 Plans:</i></p> <ul style="list-style-type: none"> • To support the Chairman's CCJO, complete 2008 JOE and begin development of 2009 Joint Operating Environment White Paper. Produce research papers with emphasis on the future trends, conditions, challenges, and opportunities faced by future joint warfighting. • Monitor, modify, and refine analysis of future trends and context to improve the JOE. • At the request of the COCOMs, Services and Multi National governments provide periodic "future briefs" to combatant commanders, multinational partners, war colleges, concept developers, services, senior contractors, and DoD officials. • Allied Command Transformation Support: (JCS Tasker) As ordered, provide US-perspective "futures support" to NATO's ACT Multiple Futures Project (MFP) and support the development of NATO future related analysis, research and strategic reports. Delivering: <ul style="list-style-type: none"> - Coordinated the 4th ACT/JFCOM Futures Forum "How Robotics/UAVs change the character of warfare" (30 Oct 09). - Produced Future Country Force Assessments Paper (15 Nov 09) - Participated as the US representative in the Albania Strategic Partnership Conference (Nov 09) - Participated in 6 workshops and led the Training MFP workshop. Incorporated relevant results into USJFCOM Training and Readiness Assessment "White Paper" - ACT Futures Study, assess the Top 50 NATO capabilities in a Bi-Strategic Command (ACT/ACO) effort to determine what NATO nations (including US) need to change to meet the future security environment (Oct 08 - Mar 09). 					

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Exhibit R-2a, PB 2010 Office of Secretary Of Defense RDT&E Project Justification			DATE: May 2009		
APPROPRIATION/BUDGET ACTIVITY 0400 - Research, Development, Test & Evaluation, Defense-Wide/BA 3 - Advanced Technology Development (ATD)		R-1 ITEM NOMENCLATURE PE 0603828D8Z Joint Experimentation		PROJECT NUMBER P808	
B. Accomplishments/Planned Program (\$ in Millions)			FY 2008	FY 2009	FY 2010
<ul style="list-style-type: none"> • Support the Bi-SC Flag Officer/General Officer prioritization event to ensure these recommendations are incorporated (5 Mar 09). • Develop “worst case” future scenarios and vignettes • Joint Operating Environment Seminars: Expanding the knowledge of Hybrid & Irregular Warfare gained in the Dec. and Feb J5 Irregular Warfare Conferences by planning and executing follow-on international conferences and seminars that explore these threats and the contexts the JFC will face in the future. (Seminars directly support the JIWC and the hybrid and IW concepts and capabilities developed across the Command, SOCOM and DOD). • Provided keynote speech at TRADOC Army Future Environment Conference & USAF A8X Air Force Futures Game. • Support to JFCOM CDR’s Joint Warfighting Conference, 12-14 May 09 • Support to Bundeswehr & JIWC by hosting the Major Urban Environments JOE Conf. 27-28 May 09 • Publish White Paper: “Russia’s Military Influence in its Near-Abroad” <p><i>FY 2010 Plans:</i></p> <ul style="list-style-type: none"> • Conduct research and Update the Joint Operating Environment White Paper for 2010 . The Joint Operating Environment (JOE) provides clarity on possible alternative future operating conditions and the challenges, and the implications of that environment on the Joint Force. • Synthesize and promote a vision of the future that includes critical analysis of future perspectives, battlefield innovation, disruptive technologies, and operational lessons learned. • With other USJFCOM activities, support the development of solutions to close/mitigate those challenges and identify means to exploit future opportunities. • Inform and support development of scenarios to for use in joint wargames and experiments • Specific and measurable outcomes include: <ul style="list-style-type: none"> - Collect and synthesize dispersed information and insights in the future - Craft a set of alternative futures scenarios to guide focused scenario development for joint exercises and experiments - Integrate USJFCOM activities to inform and influence DOD’s future force planning efforts (e.g. the DOD Analytic Agenda) 					

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B. Accomplishments/Planned Program (\$ in Millions)	FY 2008	FY 2009	FY 2010	FY 2011
<ul style="list-style-type: none"> - A joint futures narrative that integrates plausible alternative futures, develops military implications of those futures, and guides future operational concepts and requirements. - Host 2-4 conferences per year to concentrate on a subject worthy of deep analysis (e.g. Hybrid Warfare, disruptive technologies such as EMP, urban warfare) - A collaborative web presence that allows for wide participation in the development of research and to communicate the Joint Narrative. - A "feed" to the USJFCOM Joint Experimentation of the next big challenges facing the joint force that warrant concept development and experimentation focus. 				
<p>Irregular Warfare (IW)</p> <p>The institutionalization of Irregular Warfare (IW) as core competency of the U.S. Armed Forces is of critical importance. In FY10 a Joint Center of Excellence will be developed to ensure IW dominance at the small unit level, particularly against the hybrid threat. This specialized center will enable ground combat simulation and training small unit leader development capabilities to achieve parity with those serving so well in the aviation and maritime communities.</p> <p><i>FY 2010 Plans:</i></p> <p>The institutionalization of Irregular Warfare (IW) as core competency of the U.S. Armed Forces is of critical importance. In FY10 a Joint Center of Excellence will be developed to ensure IW dominance at the small unit level, particularly against the hybrid threat. This specialized center will enable ground combat simulation and training small unit leader development capabilities to achieve parity with those serving so well in the aviation and maritime communities.</p>	0.000	0.000	10.000	
C. Other Program Funding Summary (\$ in Millions) N/A				
D. Acquisition Strategy Not applicable for this item.				

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<p><u>E. Performance Metrics</u></p> <p>Performance of Joint Experimentation efforts is measured by successful development of:</p> <ul style="list-style-type: none">(1) objective validation of enhanced CoCom capabilities to perform joint missions in their assigned theaters and areas of responsibility,(2) documented delivery effective joint operational concepts,(3) confirmed production of refined and validated capability descriptions for joint materiel solutions for implementation by Service and Agency force developers and acquisition authorities,(4) identification of innovative integrated solutions and joint interoperability standards for Service-developed military capabilities, and(5) resolution of specific joint capability shortfalls delineated through the Joint Forces Command Combatant Commander Engagement process and through the Concept Joint Capabilities Integration and Development System (JCIDS), specifically in Most Pressing Military Issues (MPMI) and Integrated Priority List (IPL) shortfall compilations. <p>The JE enterprise benefits from a number of authoritative references outlining processes to develop experiments and validate results. There is no current certification process to confirm the analytical rigor and operational relevance of individual efforts undertaken by USJFCOM under the JCD&E process. In FY09, the Defense experimentation community will initiate discussions on content, context and confirmation of standards to ensure outcomes are meaningful and actionable with confidence.</p>		

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